Edgar Laing Stores
Northwest corner of Washington and
Murray Streets
New York
New York County
New York

HABS No. NY-5469

HABS
NY,
31-NEYO,
76-

PHOTOGRAPHS
WRITTEN HISTORICAL AND DESCRIPTIVE DATA
REDUCED COPIES OF MEASURED DRAWINGS

Historic American Buildings Survey
Office of Archeology and Historic Preservation
National Park Service
Department of the Interior
Washington, D.C. 20240

EDGAR LAING STORES

HABS
NY,
31-NEYO,
76-

Location: Original: Northwest corner of Washington and Murray Streets (97 Murray Street; 258, 258½, 260, 262, and 264 Washington Street), New York, New York County, New York.

Present Owner: The dismantled street facades are owned and stored by the New York City Landmarks Preservation Committee.

Present Use: Demolished in the spring of 1971.

Statement of Significance: This group of five stores, erected by James Bogardus in 1849, was the earliest example of cast iron front architecture remaining in New York City.

PART I. HISTORICAL INFORMATION

A. Physical History:

1. Original and subsequent owners: Legal description of the property: These five stores consist of lots 21 (97 Murray Street), 42 (262 Washington Street), 43 (260 Washington Street), 44 (258½ Washington Street), and 45 (258 and 258½ Washington Street).

Date	Grantor	Grantee
6/27/1844 (Lots 21, 42-45 incl.) Liber 449, page 302.	Randolph, Stuart F. Elizabeth F. William B. F. Laura F.	Laing, Edgar H.
12/21/1866 (Lot 44) Liber 1005, page 121.	Laing, Alexander K. Charlotte Reynolds, Sophia V. D.	Munsell, Henry H.
12/21/1866 (Lot 42) Liber 1005, page 129.	Laing, Alexander K. Charlotte Reynolds, Sophia V. D.	Conant, Alonzo G. Gilson, Edward A.
4/12/1869 (Lot 21) Liber 1097, page 431.	Reynolds, Sophia V. D. Laing (formerly) Laing, Alexander K. Charlotte	Radford, Thomas Louis

4/12/1869 (Lot 45) Liber 1097, page 476.	Laing, Alexander K. Charlotte Reynolds, Sophia V. D. Laing (formerly)	Seaman, Ann
4/12/1869 (Lot 43) Liber 1097, page 457.	Laing, Alexander K. Charlotte Reynolds, Sophia V. D. Laing (formerly)	Husted, Lawrence V.
5/30/1870 (Lot 43) Liber 1146, page 286.	Husted, Lawrence V.	Hustace, David Adams, Lewis B.
11/18/1872 (Lot 44) Liber 1227, page 616.	Munsell, Henry H. (exrs. of)	Hustace, William
12/30/1872 (Lot 43) Liber 1245, page 1.	Hustace, David Adams, Lewis B. (trustees)	Smith, Mary Alice Ronk, Claudina Adams, Emily
12/30/1872 (Lot 43) Liber 1245, page 3.	Smith, Mary Alice Ronk, Claudina Adams, Emily	Hustace, David Adams, Lewis B.
2/12/1873 (Liber 1234, page 547. (Lot 44)	Munsell, Sarah B. widow of Munsell, Henry H.	Hustace, William
2/12/1873 (Lot 44) Liber 1234, page 548.	Munsell, Jabey E. legatee of Munsell, Henry H.	Hustace, William
4/10/1876 (Lot 42) Liber 1370, page 294.	Conant, Nancy L.	Conant, Alonzo G.
4/22/1879 (Lot 21) Liber 1485, page 384.	Van Slyck, George W. Radford, Adelia A.	Radford, Lewis

5/1/1879 (Lot 43) Liber 1507, page 34.	Smith, Mary Alice Henry H. R. Adams, Emily Lewis B. Ronk, Claudina Charles D.	Barteld, Henry
6/7/1879 (Lot 45) Liber 1501, page 86.	Bonnett, Daniel D. Devisee of Seaman, Ann Drake Bonnett, Jane	Burnett, Samuel
12/11/1879 (Lot 42) Liber 1529, page 56.	Cullen, Henry J. Jr. (Referee) Gilson, Edward A.	Taylor, John
4/16/1880 (Lot 42) Liber 1547, page 81.	Taylor, John Elizabeth N.	Conant, Alonzo G.
10/25/1883 (Lot 44) Liber 1742, page 465.	Will of Seaman, Ann Drake	Drake, Charles Jacob
1/8/1886 (Lot 45) Liber 1921, page 315.	Phillips, Archibald William F. Jr. Edward C. May, Susan D. Phillips, Isaac B. Harry C. Lynch, Minnie G. Heirs of Phillips, Sarah Ann Phillips, Nettie L. Josephine Lynch, George E.	Bonnet, Jacob
6/26/1886 (Lot 45) Liber 1971, page 302.	Burnett, Samuel O. Mary A.	Bonnet, Jacob
5/14/1891 (Lot 43) Liber 5, page 105.	Trinity Church	Barteld, Mary Herman F. Henry C.

5/18/1891 (Lot 43) Liber 4, page 197.	Barteld, Mary Herman F. Sophia C. Henry C. Rosa E.	Wolff, Lewis S.
1/6/1898 (Lot 45) Liber 45, page 71.	Bonnet, Jacob Hill, Mary J.	Steingester, John
1/18/1898 (Lot 45) Liber 45, page 161.	Trinity Church	Bonnet, Jacob
1/31/1898 (Lot 21) Liber 46, page 149.	Radford, Lewis	Bogart, Carinus F.
5/1/1899 (Lot 21) Liber 54, page 135.	Bogart, Carinus F. Margaret E.	Steingester, John
12/1/1909 (Lot 43) Liber 124, page 295.	Wolff, Lewis S. Clara F.	Eichhorn, Samuel
11/24/1943 (Lot 21) Liber 4245, page 224.	Beatty, Caroline M. Randal, Margaret Beatty Parsell, Jean Beatty Beatty, George L. Pratt, Margaret E. John Root Steingester, Hermine A. Knapp, Elizabeth S. Steingester, Helen C. Elizabeth J.	Wolfe, William Klotz, Sam (last private owners of 97 Murray Street)
1/5/1920 (Lot 42) Liber 3120, page 212.	Conant, Alonzo G. Anna B.	Gibbons, Peter W.
6/6/1920 (Lot 42) Liber 3171, page 141.	Gibbons, Peter W.	Gibbons Realty Corp.

8/16/1928 (Lot 42) Liber 3680, page 59.	Rector, Churchwardens and Vestrymen of Trinity Church in the City of New York	Gibbons Realty Corp.
8/21/1951 (Lot 42) Liber 4743, page 179.	Gibbons Realty Corp.	Gibbons, Anna D. Kelly, Josephine G. George, Peter J.
2/14/1962 (Lot 42) Liber 5178, page 413.	Gibbons, Peter W. (trs. of) George, Peter J. Gibbons, Anna D. Kelly, Josephine G.	Miller, Helen M. Bensel, Herbert Jr. Bensel, Paul P. Wiebesiek, Regina Davidson, Joan (last private owners of 262 Washington Street)
12/1/1909 (Lot 43) Liber 124, page 295.	Wolff, Lewis S. Clara F.	Eichhorn, Samuel (last owner of 260 Washington Street)
12/31/1919 (Lot 44) Liber 3125, page 297.	Lane, Grace M.	Eichhorn, Samuel Hochberg, Morris Hochberg, Max
5/4/1928 (Lot 44) Liber 3661, page 353.	Eichhorn, (sic.) Samuel Hochberg, Morris Bessie Hochberg, Max Jennie	H E & H Realty Co.
12/2/1931 (Lot 44) Liber 3816, page 362.	Rector, Churchwardens and Vestrymen of Trinity Church in the City of New York	Eichhorn, Samuel
12/2/1931 (Lot 44) Liber 3816, page 363.	H E & E Realty Co. Inc.	Eichhorn, Samuel
12/2/1931 (Lot 44) Liber 3816, page 364.	Eichhorn, Samuel	H E & E Realty Co. Inc.

3/27/1941 (Lot 44) Liber 4099, page 334.	Eichhorn, Samuel	H E & E Realty Co. Inc.
9/7/1948 (Lot 44) Liber 4567, page 655.	H E & H Realty Co. Inc.	258½ Washington Street Corp. (last private owner)
11/24/1943 (Lot 45) Liber 4245, page 224.	Beatty, Caroline M. Randal, Margaret Beatty Parsell, Jean Beatty Beatty, George L. Pratt, Margaret E. John Root Steingester, Hermine A. Knapp, Elizabeth S. Steingester, Helen C. Elizabeth J.	Wolfe, William Klotz, Samuel (last private owners of 258 Washington Street)
1970	et al	City of New York, Department of Real Estate

2. Date of erection: Construction began February 25, 1849, and was completed two months later.

3. Architect: James Bogardus (1800-1874), "Builder in Iron," was born in Catskill, New York, and was listed in the New York City Directories as follows:

1843-44, Machinist, 87 Eldridge, h. 46 E. Broadway;
1848-49 and 1849-50, Eccentric Mill Maker, 40 Eldridge, h. 133 Madison;
1850-51, Eccentric Mill Maker and Manufacturer of Cast Iron Houses, Centre c. Duane, h. 133 Madison; and
1852-53, Iron Manufactory, Duane c. Centre, h. 143 Madison.

Bogardus' iron building construction seems to have been initiated in 1847 when Bogardus exhibited a model of a building completely of cast iron and in May 1848 laid the foundation for "The First Cast Iron House Erected." (Bannister, p. 12.) However, construction was postponed in order to erect an iron front for John Milhau at 183 Broadway, probably the first iron facade in New York City. The building was demolished sometime before 1900. The Bogardus factory, dismantled in 1859, at Centre and Duane Streets was completed soon after the Milhau building, and was quite similar to the Laing Stores completed in early

1849, though supported on internal cast iron columns. In 1854 the Bogardus works erected the Harper & Brotbers Building on Broadway, which was designed by architect John B. Corlies, utilizing a cast iron facade and wrought and cast iron framing. The internal structural system with cast and wrought iron girders was similar to that patented by Bogardus in 1850.

After the initial successes of his iron-fronted buildings in New York City, Bogardus, in association with Hamilton Hoppin, secured his first out of town contract in 1850, for the Sun Building in Baltimore, designed by architect R. G. Hatfield. By 1858, Bogardus had commissions in Philadelphia, Baltimore, Washington, Chicago, San Francisco, and Havana. Bogardus remained one of the leaders in the production of cast iron buildings until the beginning of the Civil War.

Bogardus was a very gifted and skilled mechanic, and spent several years (1836-1840) in Europe where he probably came into contact with some of the European mechanics and engineers, or their works, who were studying the properties of structural shapes at that time. Apparently, however, much of Bogardus' work was based on intuition.

Interestingly, even though Bogardus obtained a number of patents for the construction of cast iron buildings (the most notable of which was patent #7237, issued May 7, 1850, for the "Construction of the Frame, Roof, and Floor of Iron Buildings."), he never considered himself as the inventor of the iron building. However, Bogardus did claim three innovations including the method of bolting columns and girders together through their flanges, tongue-and-groove jointing of iron flooring sheets, and interlapping of roofing plates.

By 1858, Bogardus was calling himself "Architect in Iron, originatory, constructor, and patentee of iron buildings; and manufacturer of the eccentric mill" (Bannister, p. 18), for the most part a response to the growing competition and counterclaims of Daniel Badger.

James Bogardus, however, brought about the widespread adoption of cast iron as a building material particularly during the second half of the nineteenth century. His work appeared at a time when the state of technology, need, and taste combined to favor its exploitation (Bannister, p. 13).

Perhaps even more significant than the iron front, the iron tower was developed to a great extent by James

Bogardus, who completed in 1851 a bell tower in New York City which was decagonal in plan and 100 feet high (Bannister, p. 12). It consisted of six open stages of iron columns and beams, similar to those used in the iron store fronts, and had an iron spiral stairway. Several other iron bell towers were constructed including the existing bell tower at Mount Morris Park in Harlem.

Bogardus entered the Crystal Palace competition of 1852 with a design consisting of a large circular tower, 75 feet in diameter and 300 feet high, with thirteen open stages.

In 1853, a lighthouse almost identical to the fire bell towers was fabricated for the Dominican Republic by Bogardus and Hoppin. It was erected at the mouth of the Ozama River to mark the harbor of Santo Domingo and was 53 feet high (Bannister, p. 12).

An iron-framed shot tower for the McCullough Shot and Lead Company was begun on August 15, 1855 and was finished by mid-October. The tower, demolished in 1908, was 175 feet high and octagonal in plan. The sides above the ground story were enclosed with twelve inch thick panels of brick, forming an early curtain wall.

Bogardus built another shot tower in 1856 for Tatham and Brothers at 82 Beekman Street. The structure of the 217 foot high tower, demolished in 1907, was placed inside enclosing brickwork providing a solution for fireproofing. Although most of Bogardus' contributions were important and had a widespread effect on American building, the most avant-garde of all was the shot tower, which was the direct antecedent of the skyscraper with its skeletal and curtain wall construction.

4. Original plans and construction: Consisting of five stores, each with one large storage or work room on each floor and a small stairhall in the corner, the building, similar to the Bogardus factory, was constructed with four story iron facades, consisting of piers with engaged columns, spandrel beams, and double paneled wall sections.

The iron front components were cast from 150 tons of iron by four firms--the West Point Foundry of Cold Springs, New York; Burden's Iron Works of Troy, New York; the Novelty Works of Stillman, Allen & Co., and the foundry of William L. Miller, both of New York City (Bannister, p. 12). Although the iron fronts were very advanced construction for the period, the remainder of the building was of

rather standard warehouse construction--brick bearing walls and heavy wooden floor framing.

The construction of iron facades was described by Bogardus in 1856 (Bogardus, p. 6):

> The cast iron frame of the building rests upon sills which are cast in sections of any required length. These sills, by the aid of the planing machine, are made of equal thickness, so as not to admit of any variation throughout the whole; they are laid upon a stone foundation, and are fastened together with bolts. On the joints of the sills stand the columns or pilasters, all exactly equal in height, and having both their ends faced in a turning lathe so as to make them perfectly plane and parallel; and each column is firmly bolted to the ends of the two adjacent sills on which it rests. The columns support another series of sills, fascias, or cornices, in sections, of the same length as the former, but of greater height according to the design of the architect: they are separately made of equal dimensions by the planing machine, and are bolted to the columns, and to each other, in the same manner as before. On these again stands another row of columns, and on these columns rests another series of fascias or cornices; and so on, continually, for any required number of stories. The spaces between the columns are filled up with windows, doors, and panels, which may be ornamented to suit any taste. ... also immediately before uniting the pieces, it is the practice of Bogardus to apply a coating of paint to those parts which are designed to be in contact with others, "thus rendering the joints absolutely air-tight."

Some of the wall sections used both on the facades of the factory and Laing Stores had a geometric sunburst ornament in the double panels. These sections were used on the bottom stories, for the most part, and probably were all cast at the same foundry.

Originally, the facades of the Laing Stores were painted with a tan-colored paint, with sand mixed in. The sand gave the cast iron facades the appearance of stone.

5. Alterations and additions: The stores have been altered numerous times, particularly with windows in the first floor

doorways having been changed. On some floors, the stairways were enclosed by board partitions, which also enclosed sinks. Many of the interior spaces were partitioned into smaller units. Most of the richly-ornamented castings applied to cover the junctions of the spandrels, above the columns had been removed, giving the buildings a very austere appearance. Prior to demolition, the Laing Stores were in poor condition after years of neglect.

6. Important old views: Lithograph of the Bogardus Centre Street works, at the Museum of the City of New York.

B. Historical Events and Persons Associated with the Structure:

Edgar Laing, a prosperous coal merchant of New York City, commissioned the construction of a building containing five stores as a speculative venture in 1849. Until 1833, Laing was listed in Thomas Longworth's American Almanac, New York Register, and City Directory /New York: J. Seymour/ as a "Merchant" located on Murray Street, corner of Washington. In 1833-34, he was listed as a "Coal Merchant" at 256 Washington Street. After 1835-36, the address of his business was changed to 250 Washington Street, which became the site of the Laing Stores. Laing had been active for many years in selling anthracite for use in the stores of the city. By 1845, Laing had coal yards not only at 250 Washington Street, but also at East Broadway and Coverneur Street, and Thirteenth Street and Railroad Street (Doggett's New York City Directory, 1845 and 1846). The 1846-47 Directory lists Edgar H. Laing & Co. with other coal yards at 61 Leonard Street, Thirteenth Street and Hudson Street, and Twenty-first Street and Ninth Avenue. However, after 1849-50, there are no listings for Laing.

C. Sources of Information:

Badger, Daniel D. Illustrations of Iron Architecture Made by the Architectural Iron Works of the City of New York. New York: Baker & Godwin, 1865.

Bannister, Turpin C. "Bogardus Revisited Part I: The Iron Fronts," Journal of the Society of Architectural Historians, XV (December, 1956), 12-22.

Bogardus, James. Cast Iron Buildings: Their Construction and Advantages. New York: J. W. Harrison, 1856.

Condit, Carl. American Building Arts--19th Century. New York: Oxford University Press, 1961.

Doggett, John, Jr. The New York City and Co-Partnership Directory. New York: John Doggett, Jr., 1843, 1844, 1848, 1849, 1850.

Fairbairn, William. On the Application of Cast and Wrought Iron to Building Purposes. New York: John Wiley, 1854.

Kouwenhaven, John. The Columbia Historical Portrait of New York. Garden City, New York: Doubleday & Co., 1953.

Sturgis, W. Knight. "Cast-Iron in New York," Architectural Review, CXIV (October, 1953), 232-37.

Waite, John G. (ed.). Iron Architecture in New York City. Albany: New York State Historic Trust, 1972.

Wilson, Henry. The Directory of the City of New York for 1852-1853. New York: John F. Trow, 1852.

PART II. ARCHITECTURAL INFORMATION

A. General Statement:

1. Architectural interest: The five stores, four stories high above a cellar, the earliest examples of cast iron front architecture in New York City, had eight bays on the south, Murray Street facade, twelve-bays on the east, Washington Street facade, and one curved bay at the corner.

2. Condition of fabric: Demolished.

B. Description of Exterior:

1. Overall dimensions: The parallelogram plan is approximately 54'-7" on Murray Street and 109'-8" on Washington Street.

2. Foundations: Brick, sheathed with wood in some places

3. Wall construction: The street facades are cast iron, ¼" thick, panels fastened to cast iron spandrel beams and columns with bolts. The panels were uninsulated. Brick party walls with semicircular relieving arches separated the stores.

Within each of the cast iron, engaged, fluted Roman Doric columns of the facade, a wooden member (approximately 2" x 5"), was used as a spacer. In the joining of the

wooden window sash to the iron facade, wooden spacers were also used.

4. Structural system, framing: Although the construction of the iron fronts was extremely advanced for the period, the other parts of the buildings were built in a more traditional manner witb brick bearing walls and heavy wood floor joists. One difficulty encountered in combining these two types of construction was illustrated by the curving of the interior brick bearing walls to conform to the engaged columns of the iron facade. The wood roof joists were fastened to the beams of the load-carrying iron fronts with iron straps. Some of the wood floor joists rested on the channel-shaped beams. In some cases where the beams had a thick lower flange, the joists were notched. Along the east elevation, where the joists ran at acute angles to the iron facade, a heavy wood carrying timber was installed about four inches behind the iron beams. The floor joists were framed into the carrying beam to eliminate awkward connections and joist spacings caused by the flanges of the iron beams.

5. Chimneys: Small, rectangular brick chimneys were located at the brick party walls and were covered with rectangular limestone caps.

6. Openings:

   a. Doorways and doors: Though no original doors survived intact, fragments reconstructed in the measured drawings indicate that the original doors were probably similar to those of the Bogardus factory on Centre Street.

   b. Windows: Original fragments of casement sash, reconstructed in the measured drawings, indicate tbat the windows probably were similar to those of the Bogardus factory.

7. Roof:

   a. Shape, covering: The flat roof between the slate capped fire walls above the brick bearing walls, retained original flat seamed tin plates over the 97 Murray Street store.

   b. Cornice: The Laing Stores originally had a molded, projecting, cast iron cornice, which was partly supported by four-foot long tie rods, bolted to the roof.

This cornice largely replaced by tin, appears similar to that of the factory.

C. Description of Interior:

1. Floor plans: The basic floor plan was parallelogram-shaped. Each floor consisted of a large working or storage space with a small stairway in the corner. The basement probably was used originally for storage; the first floor probably was used for stores; and the upper floors were probably storage space.

2. Stairways: Narrow, wooden stairways were located in the rear corner of each store. Wooden ladders extended from the fourth floor to roof hatches.

3. Flooring: Wooden planks

4. Wall and ceiling finish: The walls consisted of unfinished exposed iron wall panels. Ceiling finish consisted of exposed floor joists and flooring of floor above.

5. Doorways and doors: No original interior doors appear to have remained prior to demolition, though some of the doors were paneled wood.

6. Hardware: Apparently no original hardware survived.

7. Special features: In the southwest corner of the fourth floor of the corner store a large wood and iron windlass hoist, was still in operating condition, and may have been original to the building.

8. Heating and lighting: The stores probably were heated originally with small cast iron stoves, which were typical of the period. Circular stovepipe openings existed at the chimneys in the brick party walls.

   At one time, the Laing Stores were lighted by gas jets. It is not known if these were original, or if another lighting system was first used. In recent years, electric lighting was installed.

D. Site:

General setting and orientation: The facades faced north and west. Prior to clearing the block for urban renewal, the adjacent Murray Street building was of similar scale and of the same cornice height. Adjacent Washington Street buildings,

though of four stories, was lower.

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April 1974